
Applying Decision Analysis to Selecting a Vendor

Purpose

To apply process ideas and techniques to a type of decision that you routinely make.

Introduction

You have had to make several vendor selection decisions recently. Each time it seems such a struggle to get the team to agree on what the objectives are, how to generate alternatives, or even what the level of the decision should be.

You need a process that you can quickly outline to other team members. One that provides you with prompts to sharpen your thinking and provides you with tools to achieve consensus on the ultimate choice.

Process Overview

The process of selecting a vendor requires the following steps:

- Describing Background
- Planning Involvement
- Clarifying Objectives
- Evaluating Alternatives
- Assessing Risks
- Making a Choice
- Setting Up Metrics
- Planning Phase-in

You may use Kepner-Tregoe's eThink Decision Analysis software program for steps 1-6. For steps 7 and 8, you will need a word processing program and a spreadsheet or database.

Describing Background

This is a key step in involving others in the decision and communicating your results to your organization. To maximize the benefits, you have to adopt different points of view, and ask what information others might want from you.

Consider this vendor's outputs, and ask:

- Which products, product families, platforms, or projects could be affected?

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- Which people, departments, or divisions could be affected?
 - Which customers or clients could be affected?
 - Which information systems could be affected?
 - Which strategic initiatives (complexity reduction, cost reduction, operational improvement) could be affected?

It has been said “the problem with military preparedness is that we’re always preparing for our most recent war, not the next one.” Be careful to avoid this pitfall in selecting a vendor. Perhaps there was a cause for why the last vendor failed. But the issues that tripped you up previously may not be the issues you are facing today, and can be outweighed. As you describe the background, consider:

- What brought you to this point?
- What other references (such as periodicals, association publications, readings, web sites, etc.) could you consult?

Then write the background as if it were a story, starting in the past and moving toward the present. Keep it simple, and keep it relevant.

There is one other pitfall to avoid here: building in a preferred alternative, or the features of a preferred alternative, right up front, before you have had a chance to consider what your objectives are. Be wary of this. If the Decision Statement summarizes the vendor decision in a sentence, the background summarizes it in a paragraph.

Planning Involvement

Different people in the organization have different requirements of vendors. Their needs should be considered in setting objectives that will drive vendor selection. In particular, consider which functions/teams/people are:

- “Upstream” of the vendor?
- “Downstream” of the vendor?
- Responsible for legal/contractual issues?
- Responsible for quality/certification issues?
- Responsible for cost/accounting issues?
- Responsible for systems/technical issues?
- Responsible for communication/administrative issues?

Also ask:

- Who has information or facts that would help us make a decision?
- Who will not commit without participating?
- Who has the authority to make the decision?

From your answers to these questions, select those who should be involved in the decision.

Next, decide *how* to involve them.

- Should each submit lists of preferred MUSTs and WANTS and WEIGHTs?
- Should you all meet together and thrash it out?
- Is an Executive Committee structure appropriate?

Different people can be involved in different ways. The key is developing buy-in, so that people are encouraged to work with the selected candidate to make the relationship effective.

Clarifying Objectives

There are a number of different types of objectives to consider in selecting a vendor:

Quality

- What performance are we looking for, and how will we measure it?
- What return rate/reject rate do we expect, and how will we measure it?
- How will this product or service fit with our existing systems, formats, and work flow?
- Does this vendor need to be certified by such organizations as the FDA, ISO, etc.?

Costing/pricing

- What cost-per-unit are we seeking?
- What cost-to-support will we bear (administrative costs, support costs)?
- What payment terms/billing format are we seeking?
- What cost-of-quality (returns, rework, inspections) will we support?
- What overhead costs (tooling, start-up costs) can we support?
- What pricing flexibility (volume-based pricing, quality-based pricing) are we seeking?

Legal/Contractual

- Are we looking for a strategic partner, ally, or for a simple supplier?
- Are we looking for a "sole-source" supplier? 80/20? One of a multiple set? Why?
- Do we expect this to be a contractual relationship? What do we expect to gain contractually?
- Do we want a "firm, fixed price," "cost-plus," or other pricing arrangement?
- Do we want to tie compensation to performance? To quality? To delivery?
- What "back-doors" do we want built into any contract? What contingencies? What venue of arbitration?
- Delivery
- Are we looking for just-in-time delivery?
- What are our delivery constraints?
- What other delivery possibilities would we want a vendor to offer us?
- What cycle-time reduction are we expecting?

As you begin to list objectives, consider:

- What kinds of objectives drive a vendor decision?
- What would some of these objectives look like?
- What other references could you consult?

These questions will help you clarify your objectives. Having clear objectives will speed up the decision.

Evaluating Alternatives

There are a number of pitfalls to consider in evaluating alternative vendors:

- Are the MUSTs really achievable? Perhaps our price-point, location requirements, or our minimum order quantity are not realistic.

Broaden the scope of your search. What you seek may be available, but not where you're looking. If no alternatives meet the MUSTs, you have to consider under what conditions you could live without each MUST.

- Are we "locked-in" to one vendor? Is it biasing our objectives or our data gathering?

Try doing a separate Decision Analysis without this vendor, as if they had just gone out of business, and compare. Are the others really this far behind?

- Are we "locked in" to one scenario? Can we raise the level of decision and recast this choice in a different light?

Try taking a step back and seeing this vendor as part of a larger supply-chain. Ask what other options you have that might meet the larger need. Alternatively, could we break this decision into a series of smaller linked decisions, such as who could provide printing? Binding? Delivery?

- Does it seem as if none of our choices are good one? How well do they score against an "ideal" vendor?

Compare the top vendors' scores against an imaginary vendor that scored "10s" on everything. How far off are we? Are the top vendors achieving 80% of what we're looking for? 50%? 20%?

- Is there something great about one of our alternatives that somehow isn't being captured? Are there other objectives we've left out?

Are we missing some objectives? Are some functions or teams or people not being heard?

- Are there risks overshadowing the evaluation? Is there some "black mark" against one alternative that is biasing the way we're evaluating it against the objectives?

Park the risks in the "parking lot" for later discussion. If there really are risks that are common to all alternatives, capture them and score all options against them.

In evaluating alternatives, look for measurable data on which everyone can agree. This is an area where "try before you buy" can help generate some helpful history.

Assessing Risks

This step should consider risks that are either not already evaluated by the objectives or that are unique to the alternative.

Some areas of potential risk to consider when selecting a vendor include the vendor's:

- Financial stability
- Relative size
- Capability and familiarity with the proposed work
- Capacity to handle your work-load, even at peak times
- Systems format and fit

- Packaging, shipping, and logistics
- Billing and accounting systems
- Billing terms, contract and exit terms, etc.

Use this list to check your most favored alternatives and to generate relevant risks.

Some other issues to consider are:

- Be wary of risks that are stated vaguely, such as “These guys just don't feel right.” Do what you can to make these feelings measurable.
- Break risks down into discrete elements, and evaluate each element independently.
- Consider both the probability and seriousness of each adverse consequence. Describe the risk using a “If X happens, then Y will be the impact” format. If you skip this step, some risks may look more serious than they are.
- Finally, remember that you will be putting together a plan to implement your preferred alternative. Some of the risks that emerge at this step can be minimized, with a little planning.

Making a Choice

The key pitfall at this crucial step is “commitment anxiety”; having a clear choice before you and stalling. Some things to consider are:

- Did the decision-maker's “pet alternative” fail?

It's sad but true. Sometimes corporate politics can interfere. Try dealing with this on the issues: Is there anything about the “pet alternative” that we don't achieve with our best balanced choice? If there is, how important is it, really?

- Is the best balanced choice just not a good one overall?

If the best alternative available only gets you 20% to 50% of what you are looking for, you may want to broaden your search for other alternatives or reconsider any “unrealistic” objectives.

- Is there one risk that just scares us to death?

Sometimes this is psychological—the actual probability of it happening is low, but our experience says it happened once before. There are two choices here: do some Potential Problem Analysis to try to minimize the risk, or just take a deep breath and “get over it.”

- Are there other decisions entailed in this one that concern us?

Some decisions are "linked," they follow directly from some other, prior decision. Consider whether what is stalling you is some down-stream scenario that seems to be unavoidable if you make this decision. If that seems to be true, consider raising the level of the decision and looking at the larger alternatives.

- Is there still conflict about the objectives?

When a decision hangs up at this point, it is often the case that there are two or more "camps" still fighting over one set of objectives versus another. When this happens, you have to go back to go forward. Take the time to work through what separates you.

- Is there still a "sentimental attachment" to the existing vendor?

This can happen, and is a natural part of the process of change. Once again, be clear about what you expect to achieve, and ask if the current vendor could really do so. If not, it's time to move on.

- Could it be that "doing nothing" is a valid alternative?

Try it. Use "Do Nothing/Status Quo" as one of the alternatives, and try rescoring it against the other alternatives. Most often, it will fail on the MUSTs.

Setting Up Metrics

Once the vendor has been selected, you need a way to assess performance. Some things to consider are:

- What needs to be measured?

Some MUST objectives may well measure one-time occurrences: is the vendor within a certain price range, a certain regulatory environment, a certain technical platform? Other objectives may or may not be fulfilled day-to-day.

Look through the MUSTs and the higher-weighted WANTS and decide what key performance indicators should be measured. Also look through the risks and look for indicators of the consequences you fear. Ask: "How will we know if this vendor is doing a good job?" Then tailor the measures to the answers that emerge.

- How much needs to be measured?

Remember that the purpose of setting up metrics is to isolate issues before they have a serious impact on your business. Anything that does not help achieve this goal is extraneous. Keep it simple and keep it relevant.

- How often does it need to be measured?

What measurement period will strike a balance between quick and effective feedback and unnecessary administrative burden? An appropriate frequency will

give you enough time to react to a developing issue before it becomes a serious problem. Note that not everything needs to be measured with the same frequency: pricing may only change quarterly or yearly, but delivery performance may vary daily.

- Who needs to be informed of the measures?

The vendor should be told up front how they will be measured, and how often. Internal resources may have to be tapped to do the measuring or to assemble it into regular reports. And key decision-makers need feedback on how well the vendor is working out.

We have all heard the saying, "trust, but verify." It applies directly to vendor selection. The process is not complete until you set up ways to measure the performance of the new vendor, and until you formally phase them in.

Planning Phase-In

Some vendors have the luxury of being phased in a step at a time. Others have to hit the ground running. Easing this transition is crucial. Remember that problems come from distinctions and changes: this is a different vendor with a changed way of doing things, and that's a situation that cries out for a simple plan. Some things to consider are:

- What risks can be minimized?

Have we planned to address those risks that were at least somewhat probable and fairly serious? Are there preventive steps we can put in place? Are there contingent actions we need to plan in advance?

- What can we do to clarify our requirements?

Metrics can help, and can lend an air of seriousness to the discussion. In some cases, it works to sit down with the vendor and let them know what objectives drove the decision and why they were chosen. But the bottom line is to make your day-to-day expectations as clear as possible.

- What can we do to integrate our systems?

System integration is a key to a clean phase-in. Systems that cannot talk to each other, or that require some rekeying or translation, can lead to rework becoming part of the process, a prospect you want to avoid. Try to plan implementation so that communication, administration, billing, and shipping all work smoothly starting on Day One.

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- What can we do to get to know our key vendors?

The "human element" is still involved, and the better you know them and the better they get to know you the less problems there should be. Plan to take the time to build in some "get acquainted activities," whether that involves meeting off-site over lunch or dinner, taking on their softball team, or getting together at a conference or a show. The more you can build a "partnership" with your vendors, the better the relationship will be.

Instructions

1. Write the background for your vendor selection decision below.

2. List who you want to involve in the decision and how you will involve them.

3. List objectives and measures for your vendor decision.

4. As you begin to evaluate alternatives, consider:

- What are some of the pitfalls?
- What would the scoring look like?
- What other references could you consult?

Identify any traps you may have fallen into while evaluating the alternatives.

5. As you begin to assess risks for your vendor selection, consider:

- What are some of the risks inherent in the most favored alternatives?
- What would the risk assessment look like?
- What other references could you consult?

List the risks to consider for your vendor selection.

6. In any decision-making process, there is always a moment of "commitment anxiety." As you get ready to make a choice, consider:

- What kinds of factors stall a decision at the final point?
- What would a selection look like?
- What other references could you consult?

List factors that could stall your decision-making process and what you can do to prevent that from occurring.

7. When setting up the metrics, consider:

- What would you want to measure, and why? (e.g., customer complaints, turnaround time, overall pricing, order entry errors, etc.)
- What would it look like?
- What other references could you consult?

List what metrics you will use to measure vendor performance.

8. There is an old Chinese saying that “well begun is half done.” This transition point can set the tone for your work together. To get the relationship started right, consider:

- What transitional factors are important to consider?
- What would a transition plan look like?
- What other references could you consider?

Describe how you plan to phase-in your new vendor.
